medemagroup

Quick guide
Spider

P9-0271-B ver. 1.0.1 - june 2011

GB

Contents

Quick guide - Spider **4**
Introduction **4**
Part names **5**
Parts Joystick R-net **6**
Using the Joystick R-net **7**
LCD Screen 8
Mode **10**
Charging **11**
Safety check **12**
Troubleshooting the R-net **12**
Serial number **14**
Driving the Spider **14**
12 tips for driving the Spider: 15
Driving on public roads: 16
Driving on stairs/escalators: 16
Brakes **17**
Motor braking: 17
Parking brake: 17
Disengagement: 17
Own notes **19**

Quick guide - Spider

Introduction

Congratulations on your new, Spider electric mobility scooter. You are now the owner of an electric mobility scooter developed for use indoors as well as outdoors. It is what is called a Class B vehicle according to the European classification of electric scooters.

For optimum enjoyment of this vehicle - and to avoid breakdowns and accidents - we recommend that you read the User Manual carefully. If you are a new user, you should pay particular attention to the section “Driving the Spider”.

Note:
This Quick Guide is to be regarded as a supplement to the User Manual. The information in the Quick Guide cannot, therefore, be expected to be complete.

NB: Errors and omissions excepted. Specifications subject to change.

We reserve the right to update this guide as required.

Warning!

The vehicle must not be lent to persons who are not completely familiar with it.

The vehicle is designed for one person only.

Max. user weight 130 kg.

Medema Production A/S is not responsible for any damage or injuries caused by inappropriate or unsafe use of the Spider.

Part names

The part names given below refer to the descriptions later in the this guide.

Parts Joystick R-net

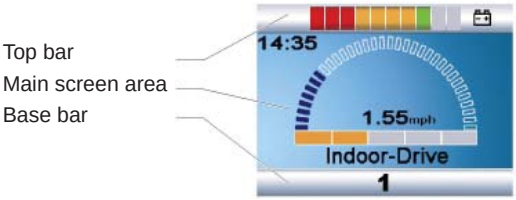
Joystick R-net	
1	Start/stop button
2	Horn
3	Lights (Extra)
4	Profile-button
5	Indicator right (Exstra)
6	Speed selection
7	Hazard warning lights (Exstra)
8	Display
9	Mode-button
10	Indicator left (Exstra)
11	Joystick

Using the Joystick R-net

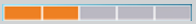
Speed selection with joystick R-net	
1	To start the whe Press button 1 and wait for the battery indicator to stabilise (3-5 seconds)
2	Select the maximum speed: Keep pressing button Speed selection to maximize or minimize the maximum speed.
Driving	
1	Start driving by moving the joystick in the direction you want to travel. The speed depends on how far forward you push the joystick. To brake, return the joystick to the starting position in the centre.
2	It is important to check the battery indicator regularly to prevent the scooter stopping because of flat batteries.

Note!
If you are driving on a sloping surface with poor grip, e.g. gravel or snow, it is important to brake gently to avoid losing control of the scooter. To brake gently: move the joystick to the central position SLOWLY.

LCD Screen



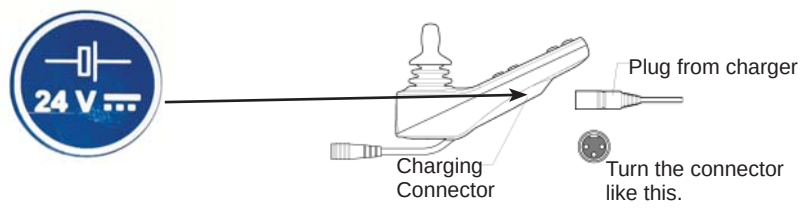
Symbol	Description
	Shown in the top bar. Color red, yellow and green - fully charged. Color red and yellow - ok, but need to be charged soon. Color red, steady - ok, but charge as soon as possible. Color red slowly blinking - charge NOW!
	Shown in the top bar. When the control system contains more than one method of direct control, such as a secondary Joystick Module, then the Module that has control of the wheelchair will display the In Focus symbol.
	Shown in the base bar. The currently selected Profile is shown in numeric form.
	Shown in the base bar. This symbol is displayed when the control system has intentionally reduced the power to the motors, in order to protect them against heat damage.
	Shown in the base bar. This symbol is displayed when the control system has intentionally reduced its own power, in order to protect itself against heat damage.
Indoor-Drive	Shown in the bottom of the main screen area. This symbol shows the chosen profile.
14:35	Shown in the top left corner of the main screen area. This displays the current time. The clock is user adjustable - Whether the clock is displayed on screen. - The display format, 12 or 24 hour - Adjusting the time.
	Shown in the center of the main screen area. This gives a proportional display of the wheelchairs speed. The Arc begins at 0% and has a programmable maximum. The programmable parameter is Max Displayed Speed.

Symbol	Description
	Shown just below the speed regulation. This displays the current maximum speed setting.
1.55mph	Shown in the center of the main screen area. This displays the actual speed of the wheelchair derived from the motors. The display can be set to mph or km/h.
	When the control system is operating in a latched condition this symbol will be displayed.
	If the speed of the wheelchair is being limited; for example, by a raised seat, then this orange symbol will be displayed. If the wheelchair is being inhibited from driving, then this red symbol will be flashing.

Mode

Mode	Description
	Displays the sections of the chair currently selected for movement.
	When Bluetooth Mode is entered the following screen will be displayed.
	When the control system requires a reboot, this symbol will be flashed.
	Waiting symbol. This symbol is displayed when the control system is changing between different states.
	This symbol will be displayed for a short time before the R-net enters into a sleep state.
	If you operate the Joystick before or just after you switch the control system on, the screen will flash the joystick displaced screen. Let go of the joystick whithin 5 secunds, or the system has to be restarted.
	When the control system safety circuits have operated and the control system has been prevented from moving the wheelchair a diagnostics screen will be displayed. This example show a warning of low battery voltage, and a trip code in the top right corner.

Charging



Charging	
1	Plug the cable into the control box on the wheelchair.
2	Plug the charger into the outlet or switch it on.
3	Use the indicator lights on the charger to check that charging has started.
4	When charging has finished, switch off or unplug the charger, and then remove the charger cable from the control box.

You are recommended to charge the batteries every night after you have used the powered wheelchair. (Further information in the User Manual)

Note:
If the batteries are damaged or are leaking, you should avoid touching them because you may burn yourself.

Contact a qualified workshop immediately!

Old batteries must be delivered to an approved facility for safe disposal.

Further information in the User Manual.

Safety check

See the User Manual

Troubleshooting the R-net

Fejlsøgning R-net	
Status light flashes with 1 flash per cycle	The battery needs charging or there is a bad connection to the battery.
Status light flashes with 2 flash per cycle	The left hand motor* has a bad connection. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 3 flash per cycle	The left hand motor* has a short circuit to a battery connection. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 4 flash per cycle	The right hand motor* has a bad connection. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 5 flash per cycle	The right hand motor* has a short circuit to a battery connection. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 6 flash per cycle	Technical fault. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 7 flash per cycle	A joystick fault is indicated. Make sure that the joystick is in the center position before switching on the control system.
Status light flashes with 8 flash per cycle	System fault is indicated. Contact a competent service engineer. (HMC or therapist).
Status light flashes with 9 flash per cycle	The parking brakes have a bad connection. Contact a competent service engineer. (HMC or therapist).

Status light flashes with 10 flash per cycle	Poor battery connection. Contact a competent service engineer. (HMC or therapist).
	An Actuator trip is indicated. Contact a competent service engineer. (HMC or therapist).
The scooter runs at half speed or not at all.	If the cause is not a raised seat, this may be a serious fault. Contact a competent service engineer as soon as possible. (HMC or therapist).

The R-net electronic system is programmable so that the driving characteristics can be optimised for individual users. Programming must only be carried out by people trained in OBP (On-board programming) control systems. Changing parameters incorrectly can produce driving characteristics that are dangerous for the user.

Note
Mobile phones should not be used very close to the scooter as they generate electromagnetic fields that may affect the electronic system. The electronic system of the scooter itself also generates some electromagnetic fields, which on rare occasions may affect equipment like the alarm systems in shops.

Dynamic's control systems have been tested and meet the requirements of ISO7176/14 and EN12184

Serial number

All scooters have a serial number plate showing the year of production and serial number. The same serial number can also be found on the front of the User Manual.

Please quote the serial number when making inquiries about servicing, spare parts, etc.

Driving the Spider

Spider is a modern device, specially developed to help you achieve maximum mobility.

If you are using the Spider for the first time, you should try out all the day-to-day situations you are likely to encounter:

- inclines/declines,
- driving on rough terrain
- driving on sloping terrain.

You should practice these manoeuvres with your therapist or other carer.

Before getting on or off the vehicle, you must check the following:

- That the scooter is switched off.
- That the scooter is not disengaged.
- That the scooter and the seat you are moving to are both stable.
- Avoid placing your full body weight on the footrests.
  This may tip the scooter forwards.

Arms and legs
While driving, you must place your arms on the armrests and your feet on

the footrests.

Cables and leads
Always make sure that cables and leads from components like the joystick are fixed using ties.

12 tips for driving the Spider:

- Driving normaly indoor og outdoor, the chassis must ALWAYS be in the higest possible setting.
- Reduce the speed when turning corners and going downhill.
- Reduce the speed when driving on inclines. Maximum incline: 6° = 10%
- Reduce the speed when driving on a sideways incline. Maximum sideways incline: 6°
- Avoid driving and parking in the rain
- Avoid parking on snow and ice.
- Always park on a level (flat) surface.
- Avoid driving on rough ground.
- Avoid driving on icy surfaces, or smooth surfaces (for example snow or freshly mown grass)
- Never attempt to climb kerbs higher than 6 cm.
- Avoiding driving over kerbs diagonally. There is a risk of tipping over.
- Not to be used for towing other vehicles, etc.

Important!
When the chassis is lowered the footrest must be reised - otherwise there is a chance that it will hit the ground.

Note!
Talk to your doctor if you are taking medicine that may affect your ability to drive motorised vehicles.

Do not drive the Spider when intoxicated. This applies to both medicine and alcohol.

Driving on public roads:
When driving on public roads, footpaths, pedestrian streets, car parks, shopping centres, etc. you must make sure you adjust your speed and distance for other users. At 7 km/h you must follow the traffic rules applicable to cyclists. This also means that your lights must be switched on during lighting-up time. (Optional extra)

On footpaths, the maximum speed is 6 km/h. In this situation you are regarded as a pedestrian.

Note:
You should assume that other road users cannot see you while you are sitting in the Spider. So take great care and wait for the road to clear before crossing.

Driving on stairs/escalators:
The scooter is not designed for use on stairs or escalators and any attempt to do so may cause serious injury to yourself and others.

Brakes

The Spider is equipped with two sets of brakes: The motor brake and the parking brake.

Motor braking:
When you drive downhill, the control unit of the Spider applies the motor brake.

Parking brake:
When the vehicle is stationary and the joystick is not moved, a magnetic brake is automatically applied to each drive unit. For driving, the magnetic brake is released first, after which the Spider can be driven as described above.

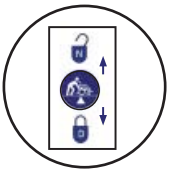
Note!
You must NEVER brake the Spider by switching off with the I/O button while moving, as this applies the magnetic brake with considerable force, with a resulting risk of tipping.

Disengagement:
The Spider is equipped with two disengagement levers one on each motor.

ALWAYS disengage on both sides

Warning!
When the scooter is disengaged, the braking system is deactivated.

You must NEVER disengage on sloping terrain. This can lead to serious damage or personal injury.



Shown in the image: Normal position for driving. Push the handles up ti disengage. ALWAYS on both sides.

Own notes

medemagroup